Eat well, live longer: Study links 5 healthy diet plans to longevity

- A recent study suggests that close adherence to healthy dietary patterns was associated with an additional 1.5 to 3.0 years of life.
- Benefits of healthy eating plans were observed regardless of genetic predisposition to shorter life span, suggesting diet can help offset inherited risk.
- Dietary plans rich in whole grains, fruits, vegetables, and other plant-based foods appeared to play a particularly important role in supporting longevity.

It is well established that following a healthy dietary plan is crucial for shaping health and well-being. This extends to the influence that dietary factors can have on longevity.

Certain dietary approaches have associations with lower mortality and healthy longevity. Typically, these patterns share many common components, such as including nutrient-rich foods, while reducing the intake of less nutritionally dense foods.

While evidence shows that dietary factors are modifiable and people can change eating patterns to improve longevity, non-modifiable factors remain.

Notably, this includes genetics and a predisposition for a shorter lifespan, with research suggesting these individuals may be 21% more likely to die early than those genetically predisposed to a long life.

However, research published in Science Advances indicates that dietary patterns can still have a meaningful impact on life expectancy, regardless of genetic predisposition.

Langkawi Chen, PhD, associate professor at Huazhong University of Science and Technology and one of the study authors, told *Medical News Today*: “This benefit holds true regardless of the genes you were born with, empowering you to positively influence your longevity through your daily food choices,” said Chen.

What did the study investigate?

The study, led by researchers at the University of Science and Technology in China, analyzed dietary and genetic data from more than 100,000 participants in the UK Biobank, a long-term health database containing rich lifestyle and health records.

Over roughly 10 years of follow-up, the research team examined how closely study volunteers’ dietary plans matched 5 well-established healthy eating patterns and estimated how these patterns correlated with life expectancy.

The 5 dietary patterns assessed were:

- Mediterranean diet
- Diabetes Risk Reduction Diet (DRRD)
- DASH diet
- Plant-based diet
- Alternative Healthy Eating Index (AHEI)

In addition to how closely their eating habits matched the dietary patterns, the research team also calculated the participants' genetic predisposition to longevity.

How 5 different dietary patterns affect longevity

By modelling expected life spans at age 45, researchers found that people with higher adherence to healthy dietary plans were estimated to live several years longer than those with the least healthy eating habits.

The researchers estimate that people could gain the following extra years by adhering to these dietary patterns:

- **Mediterranean diet**: Approximately 2.2 extra years in males and 2.3 in females
- **DRRD**: Roughly 3 extra years for males and 1.8 for females
- **DASH diet**: Around 2.3 extra years in males and 1.6 in females
- **Plant-based diet**: About 1.9 extra years in males and 1.5 years for females
- **AHEI**: Close to 2.4 extra years in males and 1.9 in females

Notably, these findings suggest that certain components of these eating plans, such as whole grains, fruits, and vegetables, are particularly important in driving longevity benefits.

"In our analyses, two components stood out with particularly strong and opposing associations. Higher intake of dietary fibre showed the strongest inverse association with all-cause mortality," Chen told *MNT*.

How can I ensure my dietary habits support longevity?

A growing body of nutritional research suggests that eating patterns rich in whole foods (particularly plant-based foods), balanced fats, and minimal added sugars can support long-term well-being.

"This could mean committing to filling half your plate with fruits and vegetables at meals, swapping refined grains for whole grains, choosing nuts for snacks, and replacing sugary

beverages with water or unsweetened tea. This shift aligns with the core principle shared by all the beneficial diets we studied," Chen said.

Similarly, Routhenstein also emphasised making small, consistent changes to help support longevity:

"Start small, one meal or habit at a time. Gradually add fibre to give your digestive system time to adjust. Add one fibre-rich food serving to a meal at a time, such as oats, beans, lentils, whole grains, fruits, or vegetables."

While the study highlights the potential life-extending impact of healthy dietary patterns, it is important to emphasise that diet is only one facet of a healthy lifestyle.

Regular physical activity, adequate sleep, and avoidance of tobacco and excessive alcohol can also play crucial roles in determining overall health and longevity.